

AMENDMENTS TO THE CLAIMS

This listing of the claims replaces all prior listings and versions:

1. (canceled).
2. (withdrawn and currently amended): An expression cassette comprising a polynucleotide comprising a sequence encoding an immunogenic Env polypeptide and having at least 90% percent identity to the full-length of the sequence shown in SEQ ID NO:46.
3. (withdrawn and currently amended): The expression cassette of claim 2, comprising a polynucleotide comprising a sequence encoding an immunogenic Env polypeptide and having at least 90% percent identity to the full-length of the sequence shown in SEQ ID NO:47.
4. (withdrawn and currently amended): The expression cassette of claim 3, comprising a polynucleotide comprising a sequence encoding an immunogenic Env polypeptide and having at least 90% percent identity to the full-length of the sequence shown in SEQ ID NO:49 or SEQ ID NO:97.
- 5 to 37. (canceled).
38. (currently amended): An expression cassette comprising a polynucleotide comprising a sequence encoding an immunogenic Env polypeptide and having at least 90% percent identity to the full-length sequence of the sequence shown in SEQ ID NO:119, SEQ ID NO:120; SEQ ID NO:121; SEQ ID NO:122; SEQ ID NO:123; SEQ ID NO:124; SEQ ID NO:125; SEQ ID NO:126; SEQ ID NO:127; SEQ ID NO:131; SEQ ID NO:132 or SEQ ID NO:133.
- 39 to 77. (canceled).

78. (withdrawn): A method of immunization of a subject, comprising, introducing an expression cassette of claim 38 into said subject under conditions that are compatible with expression of said expression cassette in said subject.

79. (withdrawn): The method of claim 78, wherein said expression cassette is introduced using a gene delivery vector.

80. (withdrawn): The method of claim 79, wherein the gene delivery vector is a non-viral vector.

81. (withdrawn): The method of claim 79, wherein said gene delivery vector is a viral vector.

82. (withdrawn): The method of claim 79, wherein said gene delivery vector is selected from the group consisting of an adenoviral vector, a vaccinia viral vector, an AAV vector, a retroviral vector, a lentiviral vector and an alphaviral vector.

83. (withdrawn): The method of claim 82, wherein said gene delivery vector is a Sindbis-virus derived vector.

84. (withdrawn): The method of claim 82, wherein said gene delivery vector is a cDNA vector.

85. (withdrawn): The method of claim 82, wherein said gene delivery vector is a eukaryotic layered viral initiation system (ELVIS).

86. (withdrawn): The method of claim 79, wherein said composition delivered using a particulate carrier.

87. (withdrawn): The method of claim 79, wherein said composition is coated on a gold or tungsten particle and said coated particle is delivered to said subject using a gene gun.

88. (withdrawn): The method of claim 79, wherein said composition is encapsulated in a liposome preparation.

89. (withdrawn): The method of claim 79, wherein said subject is a mammal.

90. (withdrawn): The method of claim 89, wherein said mammal is a human.

91. (withdrawn): A method of generating an immune response in a subject, comprising:
providing an expression cassette of claim 38,
expressing said polypeptide in a suitable host cell,
isolating said polypeptide, and
administering said polypeptide to the subject in an amount sufficient to elicit an immune response.

92. (withdrawn): A method of generating an immune response in a subject, comprising
introducing into cells of said subject an expression cassette of claim 38, under conditions that permit the expression of said polynucleotide and production of said polypeptide, thereby eliciting an immunological response to said polypeptide.

93. (withdrawn): The method of claim 92, where the method further comprises co-administration of an HIV polypeptide.

94. (withdrawn): The method of claim 93, wherein co-administration of the polypeptide to the subject is carried out before introducing said expression cassette.

95. (withdrawn): The method of claim 93, wherein co-administration of the polypeptide to the subject is carried out concurrently with introducing said expression cassette.

96. (withdrawn): The method of claim 93, wherein co-administration of the polypeptide to the subject is carried out after introducing said expression cassette.

97. (canceled).